CONNEMARA PUBLIC LIBRARY
10 MAR 1937
MADRAS

HEALTH CONTENTS, MARCH, 1937.

PAGE.

Editorial :—

PLAIN LIVING AND HIGH THINKING. ... 41

Original Articles:—

PHYSICAL FITNESS. By Khagendranath Chatterjee, M. S., Lt. I. M. S., (Retd.), Chinsura, Hoogly. ... 44

EMOTION AND DIGESTION. By U. Venkata Rao, Medical Practitioner, "Sudarsana" Madras. ... 48

CIVIC DUTIES. By T. D. Mukerjee, M.B., D.P.H., Burdwan. ... 51

PAGE.

ANTENATAL CARE OR DUTIES TOWARD PREGNANT WOMEN. By Dr. Haridas De, Late Senior House Physician, Campbell Hospital, Calcutta. ... 55

Topics of Interest from Health Periodicals:—

THE BED BUG. ... 56

CONTROL OF SMOKING HABITS, ... 57

JOHNSON'S HEALTH RULES. ... 59

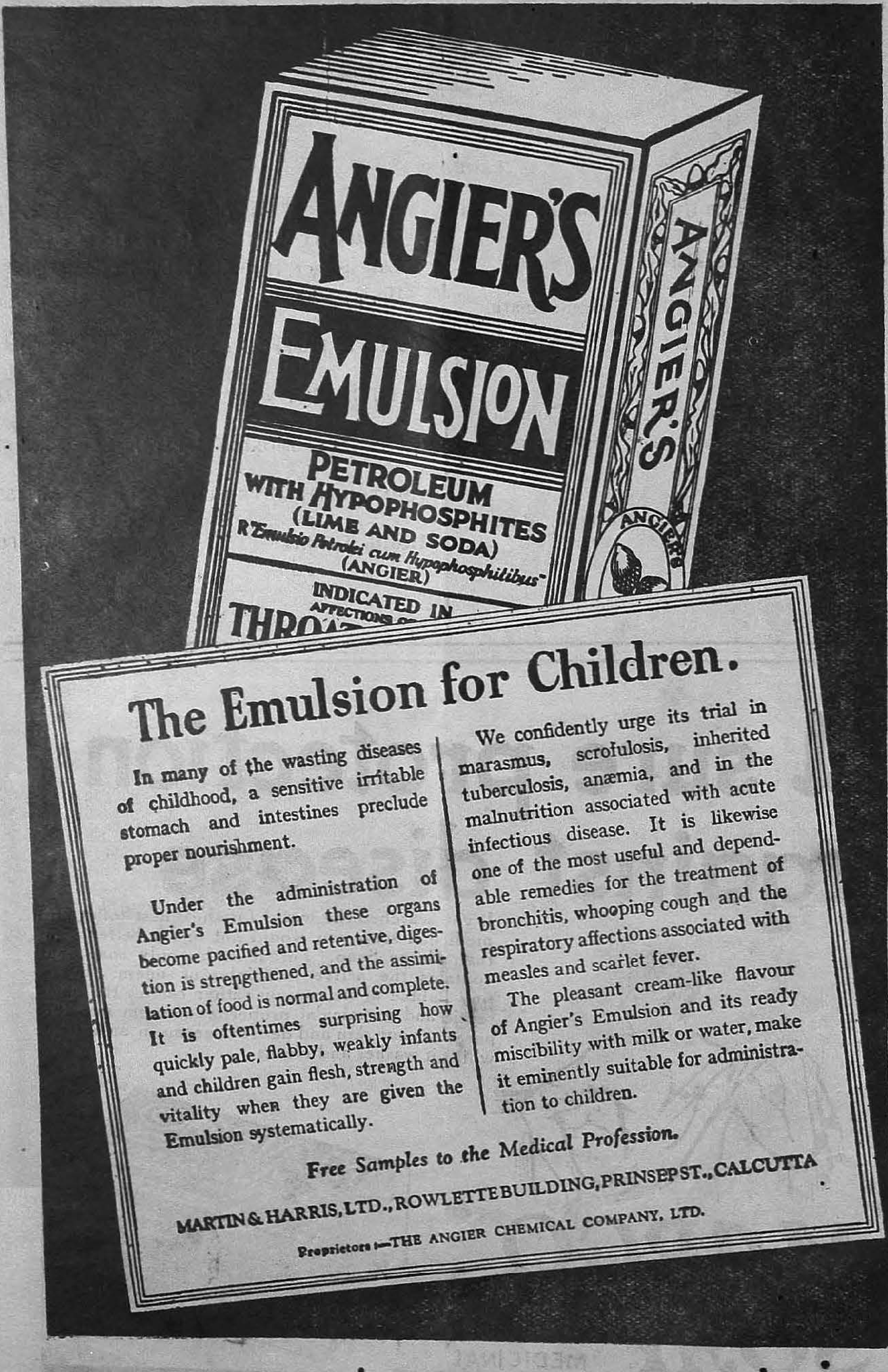
Health Tit-Bits :— ... 60

a sure protection against disease

If you searched the world for the finest toilet and medicinal soap you would not find a better soap than Margo Soap. For, it is the only soap that contains the active principles of neem. Every tiny bubble of its copious lather carries the antiseptic and germicidal properties of neem into the pores of your skin and destroys germs in an instant whilst it washes and cleans.

MARGO SOAP

TOILET & MEDICINAL


ANGIER'S
EMULSION
PETROLEUM
WITH HYPOPHOSPHITES
(LIME AND SODA)
R Emulsio Petrolei cum Hypophosphitibus
(ANGIER)
INDICATED IN
ANGIER'S
The Emulsion for Children.
In many of the wasting diseases
of childhood, a sensitive irritable
stomach and intestines preclude
proper nourishment.
Under the administration of
Angier's Emulsion these organs
become pacified and retentive, diges-
tion is strengthened, and the assimi-
lation of food is normal and complete.
It is oftentimes surprising how
quickly pale, flabby, weakly infants
and children gain flesh, strength and
vitality when they are given the
Emulsion systematically.
We confidently urge its trial in
marasmus, scrofulosis, inherited
tuberculosis, anæmia, and in the
malnutrition associated with acute
infectious disease. It is likewise
one of the most useful and depend-
able remedies for the treatment of
bronchitis, whooping cough and the
respiratory affections associated with
measles and scarlet fever.
The pleasant cream-like flavour
of Angier's Emulsion and its ready
miscibility with milk or water, make
it eminently suitable for administra-
tion to children.
Free Samples to the Medical Profession.
MARTIN & HARRIS, LTD., ROWLETTE BUILDING, PRINSEP ST., CALCUTTA
Proprietors :—THE ANGIER CHEMICAL COMPANY, LTD.

ESTD., JAN. 1923

Health

A Journal Devoted to Healthful Living

Edited By Dr. U. Rama Rau & U. Krishna Rau, M.B.B.S.

Published in
ENGLISH, TAMIL, TELUGU AND CANARESE.

Annual Subscription for any edition Re. 1-8. Foreign Rs. 2. Post paid.

Editorial and Publishing Offices:—323, Thambu Chetty Street, George Town, Madras.

Vol. XV. | MARCH, 1937 | No. 3,

CONNEMARA PUBLIC LIBRARY

Editorial

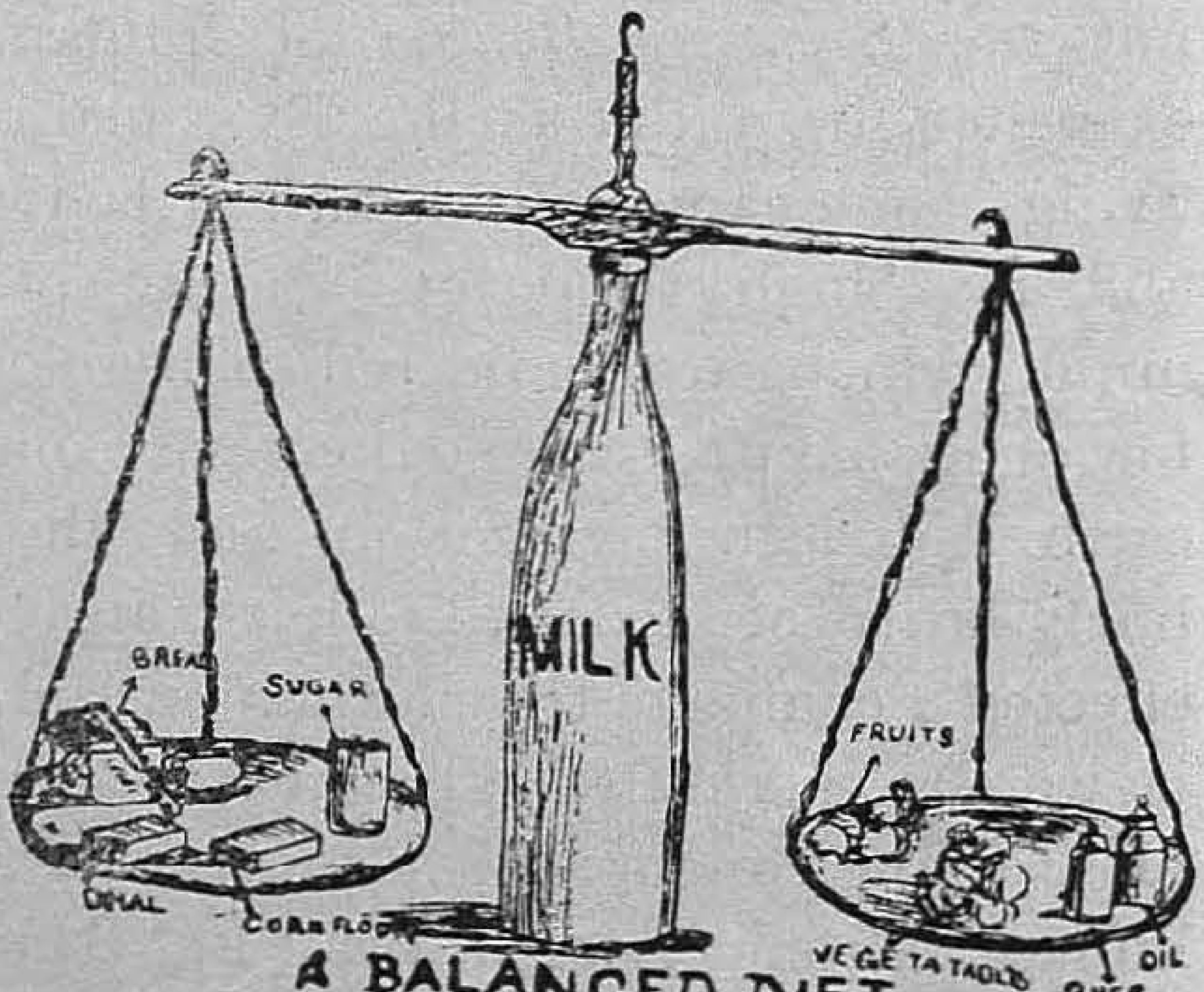
Plain Living and High Thinking

WHOEVER may have originally coined this high-sounding and highly significant expression—he must be a seer indeed—we must say he has put the *Summum Bonum* of human existence in a nut-shell. By 'plain living', one can secure health of body and by 'high thinking', health of mind, which are both indispensable for one's happiness and longevity on earth. Modern civilization and the hurly-burly of modern life have, alas! effected a complete transformation and if we are permitted to coin another phrase to connote the present-day human existence, we will call it, 'Bad Living and Light Thinking'. 'Bad Living and Light Thinking' are the order of the day even in India to-day, where for ages, 'Plain Living and High Thinking' have held sway. Let us first take the case of 'Plain Living' *versus* 'Bad Living' and show how low we have fallen from our high ideal.

'Early to bed and early to rise makes a man healthy, wealthy, and wise'—so goes the proverb. This maxim has no geographical, racial or communal limitations or barriers and is as much applicable to the orientals as to the occidentals. Our Sastras have laid down that we must rise from bed early in the morning between the hours of 4 and 5, attend to the calls of nature, clean our teeth, bathe and be ready for daily prayers before six. Is this being done now, we ask? People roll in their beds till seven or eight in the morning, having gone to

bed late at night after attending a nerve-racking cinema show or participating in an exciting ball or dance or cards play. Meanwhile, their coffee-time is up and the craving for it comes in as sure as the Sun rises in the East. Being drowsy and disinclined to get up, and anxious not to miss their coffee hour, lest terrible head-ache should torment them, they order for the coffee while still in bed and sip it slowly and say, "Ah! how I feel—it is simply stimulating, soothing, refreshing, exhilarating and so on". This they call 'bed coffee! With this coffee, runs down their throats into their stomachs, all the undigested and indigestible particles of food taken the previous night, stuck between their teeth. These set up toxic disorders in their stomachs slowly but surely, culminating in the long run in diarrhoea, dyspepsia, stomach and duodenal ulcers and so on. Now there is no need for cleaning the teeth, for they have been cleaned already, if not by plain water and twigs of specific trees, at least by a more costly liquid coffee, and such of those who wish to clean their teeth do so more as a routine than as a duty and have recourse to costly powders and pastes which merely help to whiten the enamel of the teeth but not clean the crevices. By that time, the natural urge for evacuating the bowels is gone and that poison also gets circulated into the system. When they get up after seven or eight, they have more calls waiting outside to attend to and the calls of Nature are forgotten or postponed for a more convenient hour. But that hour never comes and when this process is daily repeated, it results in chronic constipation which is said to be the bane of modern civilization and the fore-runner of all ills, which human flesh is heir to. As the hour for going out for daily work approaches, a few tumblerfuls of water are poured over the body, a hasty meal is taken, a heavy dress is donned and off they go, with a thermo-flask full of coffee for lunch.

Let us now take up "Food". Plain living demands that after bath and prayer in the morning, one should take some light food, *i.e.*, breakfast. This breakfast, for the rich may consist of rice or wheat preparations and water or better still, milk and fruits. For the poor, rice or ragi gruel or porridge with butter milk. Those who have to attend office at 10 in the morning need have no breakfast at all. They can give a few more hours' rest to their stomachs and sit for their morning full meal with a keen appetite. Modern scientific teaching now lays special emphasis on the importance of certain protective foods. These protective foods are milk, cheese, meat, eggs, vegetables, fruits and potatoes. The Ministry of Health Advisory Committee on Nutrition (England), issued the following statement recently: "A pint of milk



A BALANCED DIET

per head per day should be allowed and special care should be taken that the full amount is in fact received by

each child under sixteen. A considerable portion of this milk should be taken at breakfast". India was for a long time known as a land flowing with milk and honey. The mere fact that the Hindus worship the cows is sufficient testimony of the nutritive value of milk and milk products. Milk used to be the principal diet in every household even till quarter of a century ago. But, what is the condition of India to-day? India is now a land flooded with coffee and sugar. There can be no breakfast without coffee. There can be no lunch without coffee. In the evening, one must have a cup of coffee after a hard day's work and in the night, when going to bed, hot coffee has been substituted for milk. Milk is thus consumed only with coffee and the proportion of coffee decoction to milk is 9 : 1. Coffee has premeated even the remote village homes and infants up to five years also have their quota of coffee in the mornings. On marriage occasions and funeral rites, coffee tops the budget list. India is going terribly coffee-mad. It is high time, therefore that sufficient propaganda is made to put a stop to this pernicious habit of frequent and excessive coffee drinking. Now, what are the evil effects of coffee? Coffee contains a poisonous drug called Caffein. Caffein is a powerful stimulant of the nervous system. Even small doses "increase mental activity, quicken perception, induce wakefulness and lessen the sense of fatigue, which is Nature's danger-signal pointing to the need of rest and sleep". But this relief is highly deceptive. Coffee and tea instead of curing fatigue, hide it by benumbing the fatigue centres. The symptoms of Caffein poisoning are graphically summarised by Dr. W. Foessler of Zurich thus:—

"By irritating the cerebral cortex and spinal and heart centers, pressure and congestion of the head are produced, also general unrest and excitement, sweating, hallucinations, increased tendon reflexes, coldness and numbness in hands and feet, rapid fatigue of body and mind, fear, angina-like heart attacks, sleeplessness, trembling of muscles and hands, shortness of breath, increase of respiration, palpitation, rapidity and reduction of pulse volume, cardiac and pulse irregularity, nausea, diarrhoea, constipation, colic, dyspepsia, gastralgia, flatulence, loss of flesh and loss of appetite".

By habitual use of coffee, a craving is created in the same way as for alcohol or tobacco. "Instead of being served by it, one becomes a slave to it. One often meets people who are so much under its dominion that they feel that they connot carry on without their coffee at the accustomed hours".

Recent investigators have discovered that coffee causes insanity. In the January '37 issue of "*Good Health*, (*U. S. A.*) several cases of insanity from coffee have been reported. These cases recovered when coffee was withheld. The article concludes: "Civilised society will sometime see the folly of aggravating the effects of the nerve strain resulting from our highly tense modern life by the use of such tension-raising drugs as tea and coffee, cocoa-cola, chocolate, mate, tobacco, all of which are habit-forming poisons". Coffee-drinking is also economically unsound. The money spent on coffee-seeds may more profitably be spent on milk and milk products. Many ills can thereby be prevented and much of doctor's bills saved.

For want of space, we reserve further consideration of the subject for the next issue.

Physical Fitness

(Contd. from p. 8, Vol. XV, No. 1, Jan. '37 issue of 'Health').

—By Khagendranath Chatterjee,—
M S., Lt. I.M.S.,(Retd.), Chinsura, Hoogly.

The Mouth, Teeth and Gums

It has been stated, that the throat is continuous with the mouth, which is in fact, the beginning of the great body canal, the digestive canal, or anatomically, the alimentary canal. The food-pipe, the stomach, the intestines, are all one by one, parts of the same canal. By mouth, we are not only able to eat but also to speak, as it is by the joint actions of the lips, the teeth and the tongue, that we can eat, as well as speak.

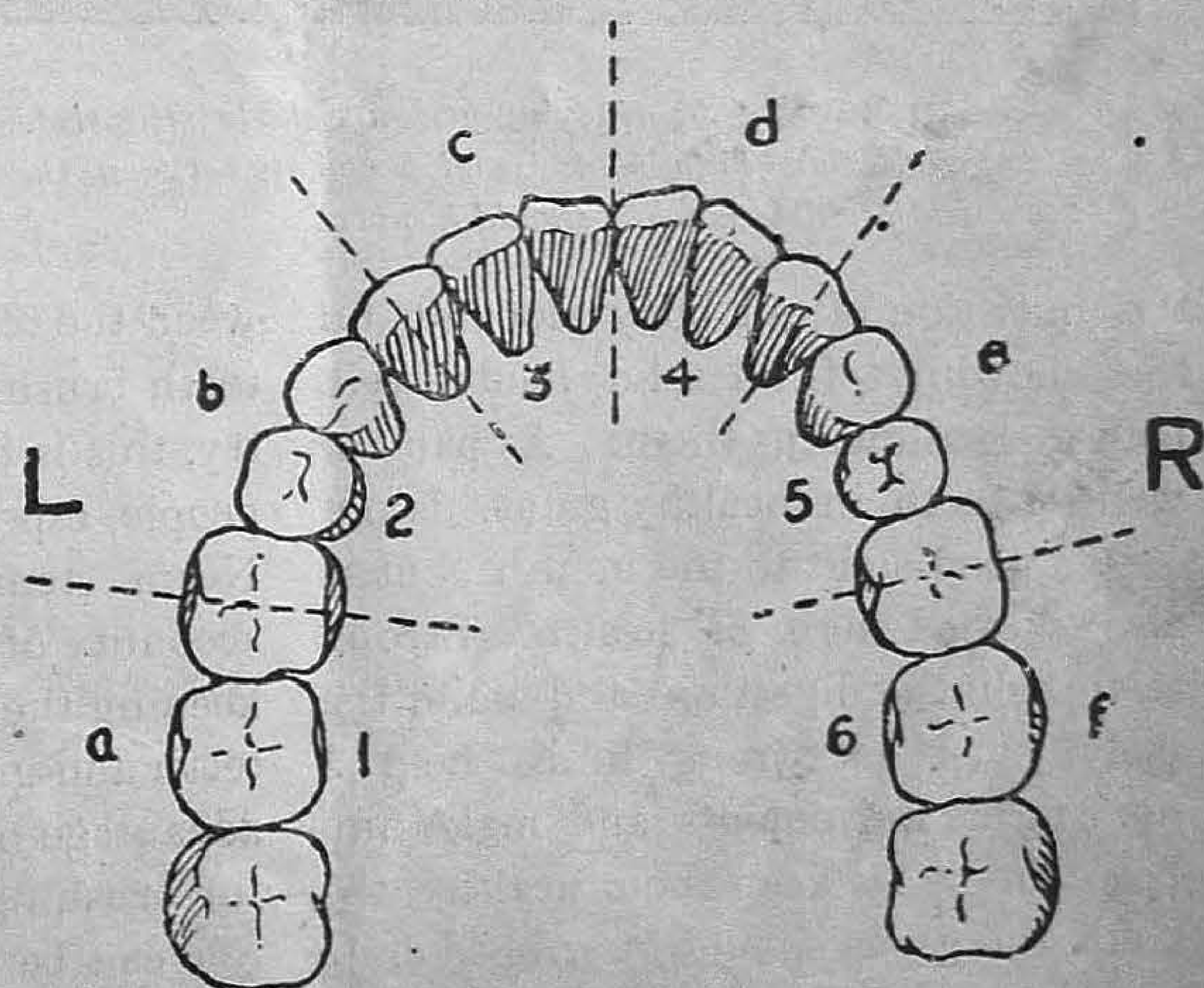
Like all cavities, the cavity of the mouth is bounded by a roof, the walls, and a floor. The roof is formed by a wide arch, called the palate, the front portion of which is bony, and therefore fixed and hard, and is called the Hard Palate, its back part is soft and movable, and is called the Soft Palate, mention of which has been made in the previous paper, at the time of describing the Fauces, which separate the throat from the mouth. The walls of the cavity are bounded by the cheeks. On the floor of the mouth, lies the tongue, which is the organ of taste as by its means, we get the taste of various kinds of foods. Small rounded bodies, some of which are of the size of a pin's head, some are bigger and some smaller, are to be seen lying all over the surface of the tongue. The bigger ones are specially to be found on the back part to form two rows making an angle at their meeting point. The smaller ones are scattered over the entire surface. These are called the taste buds, and carry the sense of taste to the brain.

The mouth contains two other important structures, the teeth, and the gums, which will be narrated shortly. The mouth is guarded by the lips, which help in opening and closing the cavity. The lips also protect the gums and teeth, by covering them, and are also essential for the utterance of sounds and certain letters which will not be possible without them. The tongue, in the healthy state should be clean and moist and as such is an indication of the healthy condition of the stomach and intestines. A short description of the lips is necessary so as to give an idea of the deformity that affects the parts, and their relation to the nasal passages, and cavity of the mouth. The lips consist of muscles of the face and are continuous with the cheek, the nose etc. The upper lip is just below the nose, and its middle part is in the same line with the septum, while the nasal passages lie above it. There is a spear-shaped, groove or channel along the middle line of this lip, dividing it into two equal halves. The lower lip is equal in length to the upper, and its border slightly everted, that is, turned inside out, while that of the upper is plain. The two lips unite together to form what is known as the angles of the mouth, as they look like angles, when the mouth is opened wide. It should

be reminded here, that the nasal passages rest above the Hard Palate which is the roof of the mouth, and in case of a natural tear in the Hard Palate the two cavities become one, that is, they communicate with each other. A defect of this nature will be described presently.

The face appears beautiful with a pair of well shaped and clear cut lips, as it does with a sharp nose, but unfortunately a type of born defect, of the upper lip not only disfigures the face, but destroys its natural functions. Due to faulty growth in the foetus, from the mother's womb the lip remains divided either partially or completely, in the middle line, up to the septum of the nose, and is sometimes combined with a similar cleft in the Hard Palate, in which case, the nasal passages become one with the cavity of the mouth. This condition is known as Hare-lip and cleft palate combined. These born defects can be repaired, and should be done so as early as possible, in order not only to remove the ugly sight, but to restore the normal functions. The cleft palate imparts a nasal tone to the voice, and prevents the proper chewing of the food, which is liable to come out through the rent. Children born with these defects, should be taken to surgical experts, who can mend them, and bring back their natural conditions.

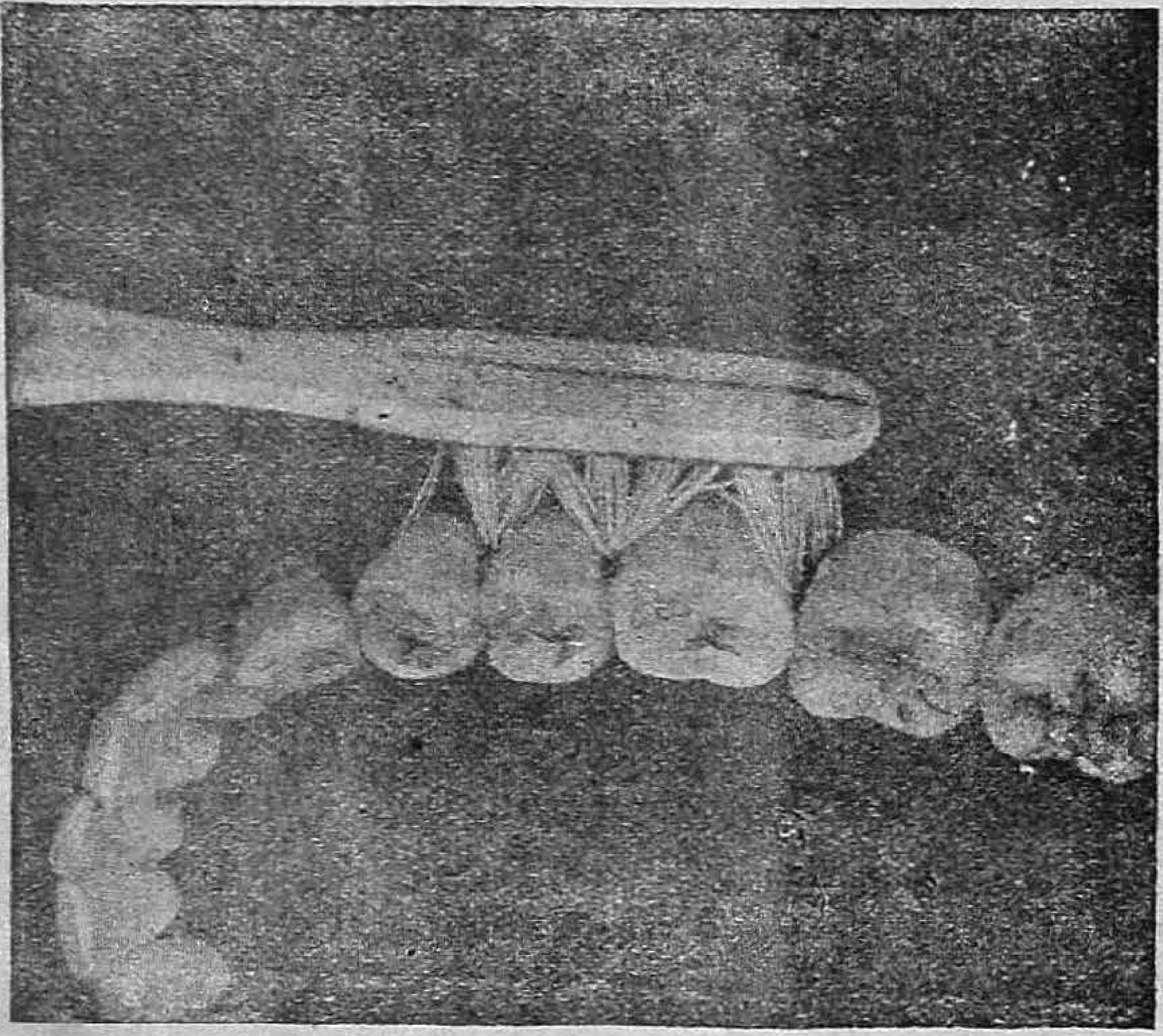
Behind the lips, are the gums, and two sets of teeth imbedded in them. The gums are composed of fibrous and mucous tissues covering the borders of the jaws which face each other. These borders are called the "Alveolar processes", on account of the presence of several alveolar or hollow spaces in them for the reception of the teeth. These hollows are called the "sockets" of the teeth. As the shapes of the jaws are like the bends of a circle, the teeth and gums similarly look like curves of a circle. The upper jaw being wider than the lower, the upper set of teeth slightly overlaps the lower in the healthy state. These natural curves of the jaws, however are disfigured by prolonged mouth-breathing in childhood, on account of chronic obstruction in the nose and throat, and consequently the teeth appear irregularly and crowded, for want of space. When the upper jaw becomes narrower than usual, the upper teeth project from the mouth and lips. These happen, due to lack of inspection of children's mouth and throat, when they are very young. The diseased conditions of the teeth and gums, in after-life are also due to want of care and to laziness. Of course, these may



Teeth.

follow infective fevers like the typhoid or diseases of the stomach and intestines, like dyspepsia and chronic colitis, but in the majority of cases, they are due to lack of care. It should, however, be mentioned here, that the preservation of the teeth and gums also depends on the taking of particular diets along with our daily food, which will be referred to, later on.

For the sake of our health, the teeth and gums must be healthy, as the nutrition of our body depends on the chewing of all solid foods well, before swallowing them. A pair of well set teeth in healthy gums, is not only a good sight to the mouth, but is also a good sign of health. Strong teeth help the digestion and build the body, just as strong limbs help a man in his movements and make him powerful. To keep them healthy, the teeth and gums should be rubbed daily and cleansed, twice at least, particularly after eating, as the food particles lodge in the spaces between the teeth and gums, and if not removed, they begin to putrefy, and collect at the margin of the gums. A coating of this putrid matter is also laid over the white surface of the teeth, called the Enamel, and a foul odour is given off, whenever the mouth is opened. These food particles can be removed with the finger, when washing the mouth immediately after eating, which the Indians habitually do. The teeth should be rubbed inside and outside everytime, and the gums with them, as on rubbing the gums, healthy blood flows into them and keeps them as well as the teeth, which are also fed by the blood, fit. The finger, however, is not very suitable for the purpose, and a soft brush, or a similar article, is more convenient. The stem of a green plant may be used for this object, and when crushed beween the teeth, it acts like the artificial tooth brush, just as good. In our country, this is the usual practice with all people, especially in villages, and the Neem stem is the most popular on account of its medicinal virtues in keeping the mouth antiseptic and the teeth and gums healthy. The further advantage of using the twig of a plant for brushing the teeth, is that a fresh one can be used every time and then thrown off, so that the impurities of



...TH BRUSH.—*by applying pressure the bristles slide from the 'high spots' and permeate between the teeth. This is what should happen.*

the mouth cannot re-enter the mouth, as is possible from the artificial brush. In European countries, or places where such a plant twig is not within easy reach, the artificial brush will have to be used, but whenever a fresh vegetable stalk is available, it should be given preference. The artificial tooth brush must be carefully selected at the time of buying one, choosing a variety which fits the shape of the jaws and teeth and the bristles should be so wide apart, that the impurities of the teeth may not collect between them. The brush should be washed carefully every time after use. A good type of tooth brush is a bit costly, and is generally sold after disinfection.

The word "sterilised" is written on such brushes. Yet it is better to disinfect them a second time, before using, by boiling them for a few minutes, or dipping them in a weak carbolic lotion for some hours. The cheap variety should never be purchased, as it may carry the germs of the most dangerous diseases like anthrax and tetanus, as the unsterilised and cheap bristles are likely to be infected with the germs of these diseases. The eggs of the germs of tetanus and anthrax which are called the "spores" are so resistant, that they do not die, even when boiled for a few minutes. To keep the healthy teeth and gums in good condition, it is enough to clean them with the tooth brush only, but for diseased gums and teeth some antiseptic and medicated tooth powder or paste is necessary. A carbolised powder or a paste containing Thymol, peppermint or oil of winter green, is useful for the purpose, as these drugs destroy the germs, of diseases, and give a freshness to the mouth, removing all bad odour and taste. Every effort should be made, to maintain the polish and the white coating of the teeth, called the enamel, by attending to them with care, day after day, in the way described. When the enamel wears out, the teeth decay, and the gums become unhealthy, and caries of teeth, pyorrhoea, or pus in the sockets of the teeth, gradually follow.

It has been stated, that besides taking care of the teeth by cleaning them every day, foods containing vitamins of the C and D class, which are necessary for the nutrition of the teeth and gums, should be taken regularly and in sufficient quantities. Vitamin C is necessary for the gums, and its absence is followed by a disease called scurvy in which the gums swell and bleed freely. The condition was observed to happen amongst the crew of ships, in former days who had to travel over the seas for months together sometimes, by living solely on dry and artificial foods. The men began to suffer from this painful disease, and at first nothing could be done to check it. It was discovered, accidentally, however, that the disease could be cured and even prevented by taking lemon and oranges. It has been known since then, that there is present such a substance in the oranges and other fresh fruits which can check and cure scurvy. This property in the fruits is called Vitamin C. The teeth are composed chiefly of the calcium salts and the phosphates, and as these are present in green vegetables like the cabbage, the cauliflower, peas, the spinach or palam sak, the puin sak, and similar green leaves of the shrub and creeper class, they should be taken

in abundance, and regularly with our daily food. Milk which is rich in calcium salts is beneficial for the teeth, especially for the teeth of growing children. As the teeth are like the bones in many respects, foods rich in vitamin D such as cream and eggs, are also useful for their growth and nutrition. Artificial and dry foods should be avoided as far as possible and fresh fruits and green vegetables should always form a part of our daily diet. A general description of the teeth, their appearance, situation, action etc. will be given in the next paper with diagrams.

Emotion and Digestion

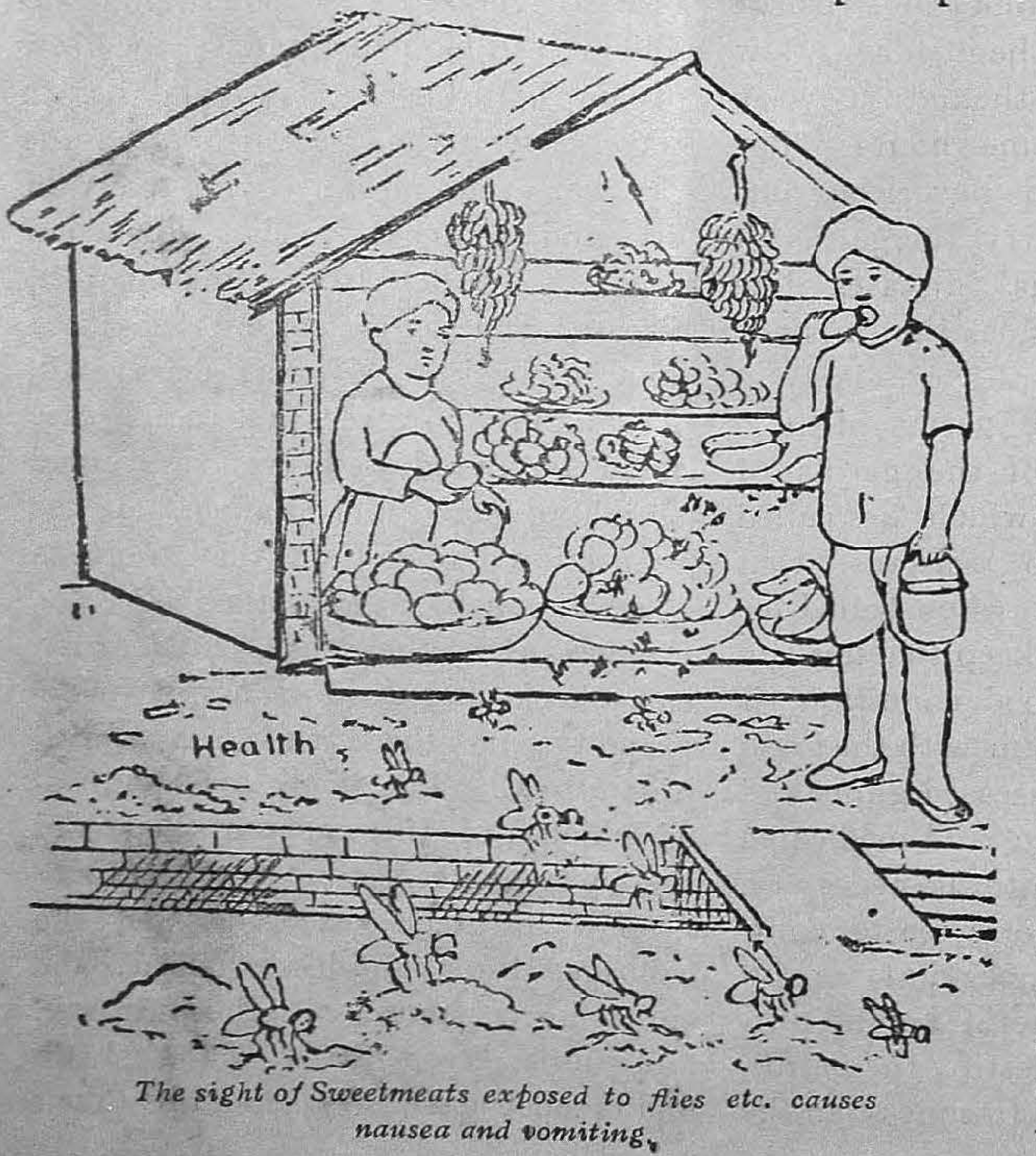
By U. Venkata Rao

Medical Practitioner, "Sudarsana",

Madras.

THE very sight and smell of food exert a great influence in starting digestion. A tastefully arranged meal, clean linen, an agreeable odour, the presence of cheerful family and friends, cause mouth to water showing that the digestive organs are ready to pour heir secretions in anticipation of food.

The stomach is very susceptible to the slightest change in the mental state. "A merry heart doth good like medicine". Want of sociability and good cheer predisposes to indigestion. One who eats his food in solitude without a pleasant smile is more liable to indigestion. A cheerful frame of mind aids digestion; an unhappy and agitated mental state leads to a long train of stomach and intestinal ailments. Often good food becomes difficult or impossible to digest if the person is of peevish and suspicious temperament. The sight or even hearing of the preparation of certain articles of food, the offensive odour which certain



The sight of Sweetmeats exposed to flies etc. causes nausea and vomiting.

articles produce while cooking, might produce vomiting and cause a dislike to them as cabbage, onions, bad ghee or oil. In some, the mere sight of a fly, ant or any insect is sufficient to start vomiting and there are others who cannot eat with relish and later digest foods like butter, butter-milk, eggs, milk etc. unless they know they are fresh and clean. The very thought of an emetic or even of castor-oil produces nausea and fear causes looseness of the bowels. The presence of a sick person in the house prevents many from relishing food. "The chronic grumbler and fault-finder, the over-particular person who will not eat with equanimity unless the food is prepared exactly to suit him, is much more prone to dyspepsia than the cheery optimist who looks at the bright side, who makes allowances for small short comings in the meals or in those who prepare them and who can rise superior to the little nagging worries of every day life".

Custom and social habits have much to do with the digestibility of food-stuffs. "Articles that are highly prized delicacies in some places are abhorred in others". The sweets especially "Pal-Kova" that are much eaten by the people in North India, causes indigestion to the Southern Indians, while the rice cakes and *Vadai* much liked by the latter are not digested by the former.

Some articles of food which produce disgust at first if continually eaten, may eventually become valued and and liked best. So, under the stress of necessity and pursuasion and the influence of friends and examples many prejudices are overcome.

There are idiosyncrasies to be considered. What is good for one is injurious to others. Some do not like eggs; in some butter or ghee causes diarrhoea; there are some with whom milk disagrees and others in whom butter milk brings on cold and sore-throat. This mental fear with regard to some articles of food may have originated during childhood when a particular food caused digestive trouble and that article has been asked to be avoided and to eat it would be to invite bad consequences. Since then he has not eaten it and to eat it now, he thinks, would act as a poison. Sometimes one avoids a particular food when he finds this disagrees with his friends and relatives. Even such food eaten eagerly, fondly and in large quantities during childhood are avoided later on when the same food brought on indigestion on an occasion and the doctor assigned the cause to it. Some avoid *keerai* and *keerai-thandu*, fearing they would bring on elephantiasis, others avoid 'butter-milk' fearing it would bring on cold, sorethroat, fever etc. "Many of the cults and isms and schools of new thought by their fallacious doctrines cultivate in the minds of their devotees genuine phobias for elements and articles of food that are important to bodily strength and welfare".

Many people dread indigestion and fear that the first sign of discomfort in the stomach is the beginning of a progressive sickness and the consequence is a reaction out of proportion to the ailment. These people begin to scrutinize their diet, consult their friends and books and study how to modify their diet. They gradually avoid the supposedly indigestible food, first fats, then some vegetables and then fruits; many think it harmful to drink water during meals. Thus gra-

[*Page 49*

dually they avoid one article after another thinking they are indigestible. These self-made invalids suffer long not so much from faulty digestion as from chronic starvation, often they live on a monotonous diet. They become weak and emaciated due to the rigorous diet for months and years lacking in the legitimate caloric requirements. Such people constantly think of their digestion day in and day out and talk to their friends and relatives always about their digestion and the diet they follow. It becomes their hobby and they are always miserable and suffer from a psychic form of indigestion. Such persons are usually thin, nervous, emotional, constipated, suffering from sleeplessness and complaining frequently of indigestion. They are habitually taking medicine for constipation, indigestion and sleeplessness. Some of them are so fearful that their stomachs would not bear any solid food. These must be carefully and tactfully brought round to take back all the discarded wholesome foods. To soothe the body and mind, a course of baths, massage, electricity and a graduated scheme of diet is needed. Sympathy with such people is necessary with a certain amount of firmness. Faith and courage favour strong and regular contractions of the stomach muscles, while fear or anger, ill-temper and disgust either weakens or inhibits them.

Psychotherapy benefits much in gastro-intestinal disorders. One must always infuse courage and cheer into the mind of the patient. Some have recovered even after an unfavourable prognosis—the diagnosis may be wrong or the patient may possess a recuperative power not realised by the doctor. Therefore, the physician should inspire confidence and should not laugh at the patient's recital of woes though they be ridiculous. Every one has heard that a certain Doctor's medicine helped him more than some others because the patient had more confidence. Tact and personality go a long way and the first impressions are often lasting. Most of the patients may not be suffering from any organic disease. Some are on a diet self-imposed or instituted by the physician a long time back, often inadequate to furnish the necessary calories required by the body which becomes ill-nourished. Such people suffer from hunger pains, weakness, emotional outbreaks and vague discomforts due to slow starvation and with fear of food. In such cases every endeavour should be made to change the mental attitude of fear into one of courage and confidence.

Change.—Many people find that they can eat and digest articles of food on holidays or pleasure trips, which would disturb them at other times. On such occasions their minds are carefree and the thoughts are diverted from their stomach to other external objects. In such cases it is advisable to send them abroad on long vacation or at least bring a change in the business habits. " To take the wearied book-keeper from his desk and put him on the road for a while; to place the road worn travelling man in the quiet haven of an office; to send the blast city man out among the green trees and meadows of the country or to take the housewife who has grown sick and weary under the monotony of life in some isolated community and let her enjoy the bustle and sights of a greater city for a season."—these often banish introspection, self-analysis, self-pity and digestive thought.

— CIVIC DUTIES —

By T. D. Mukerjee, M.B., D.P.H.,
Burdwan

THE civic duties relate to duties of a person residing in a city. They are the obligations, for which one must have regard, if the person resides in a town.

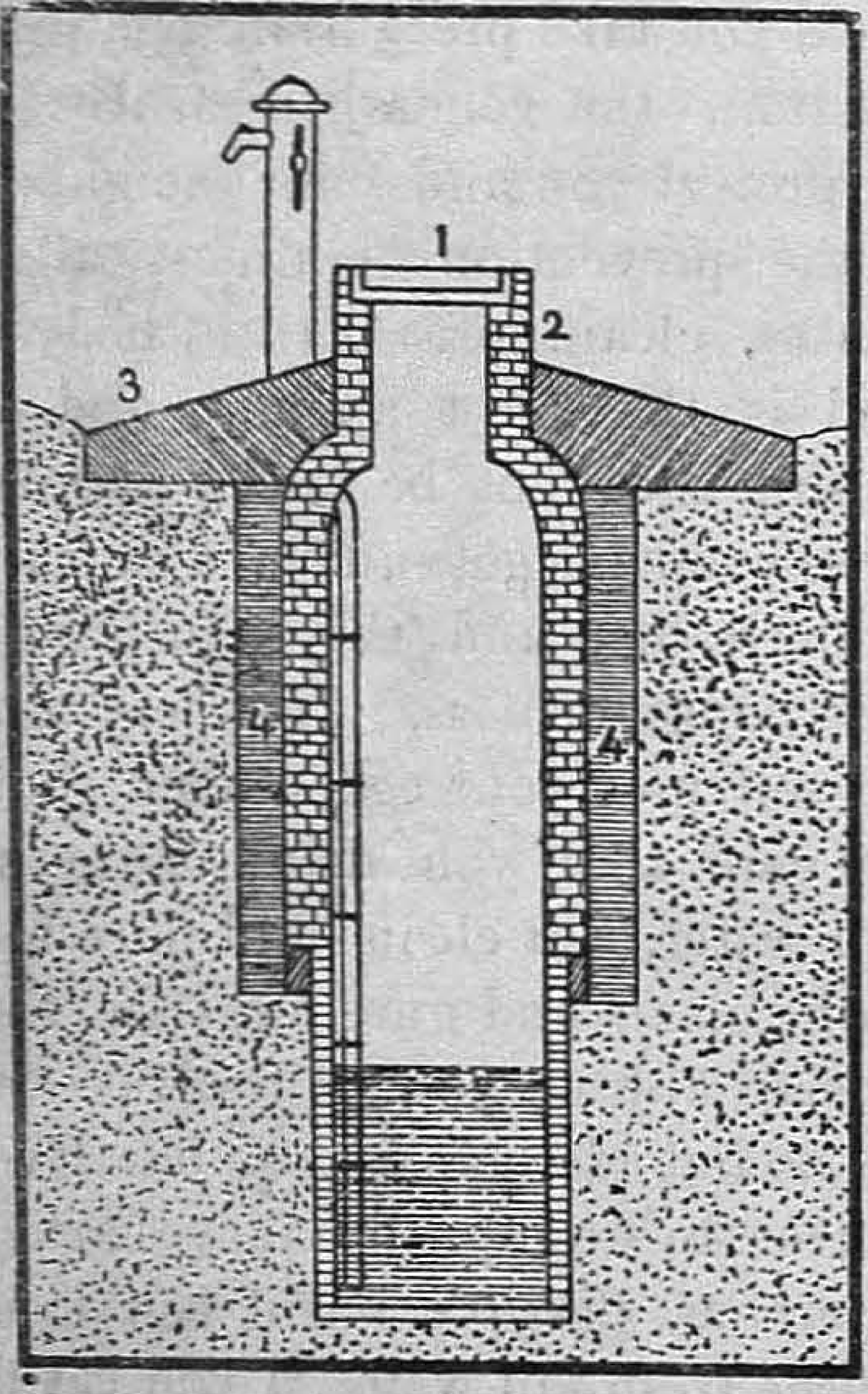
What are these duties and what is the present situation?

In every town there is a Municipality and the Latin word "Municipalis" means a 'free town'. Every Municipality is under Local Self-Government and is guided by a Special Act, and is managed by a few elected and nominated gentlemen of the town. As the management lies in the hands of the local people, the meaning of freedom is understood. People of the town pay taxes and the expenditure is defrayed from that sum of money and the work is managed by their representatives; so, the condition of a town is rather a reflection of the people of the place. Though there is a general measure for the management, every individual person has also got some duty to help it in every way. Unless and until this help is obtained, the management will be a failure and unless and until the sense of this help is understood by the rate payers, the sanitation of a town cannot be improved; and this is why, every one living in a town is morally bound to perform his or her civic duties.

For the various communicable diseases, there are general prophylactic measures, as well as personal ones. As for example, suppose cholera has broken out in some locality, the use of disinfectants, cleaning of the locality etc. are done by the Municipality, but unless and until the people of the locality take personal measures, it is not possible to prevent the recurrence of the disease. Unless you keep yourselves clean, unless you take all foods boiled, unless you guard against flies, unless you take precaution against indigestion, the general measures will not protect you and your neighbours. In the prevention of almost all the diseases, cleanliness both in body and mind is the sheet anchor, and this cleanliness cannot be forced upon you unless you have got sufficient education for the same, and this education is your consciousness, your existence, your self and your ego. You should take care that you drink pure and clean water, eat clean and pure food, breathe clean and pure air. In these matters unless you yourselves take care, no outside help is possible. Every city tries to supply the above articles as pure as possible but if you do not take the fresh tap water, if you eat-fly-contaminated rotten articles, if you sleep in a closed room and remain always in a crowded place, it is your fault, when you suffer from any disease and spread the same to your neighbours.

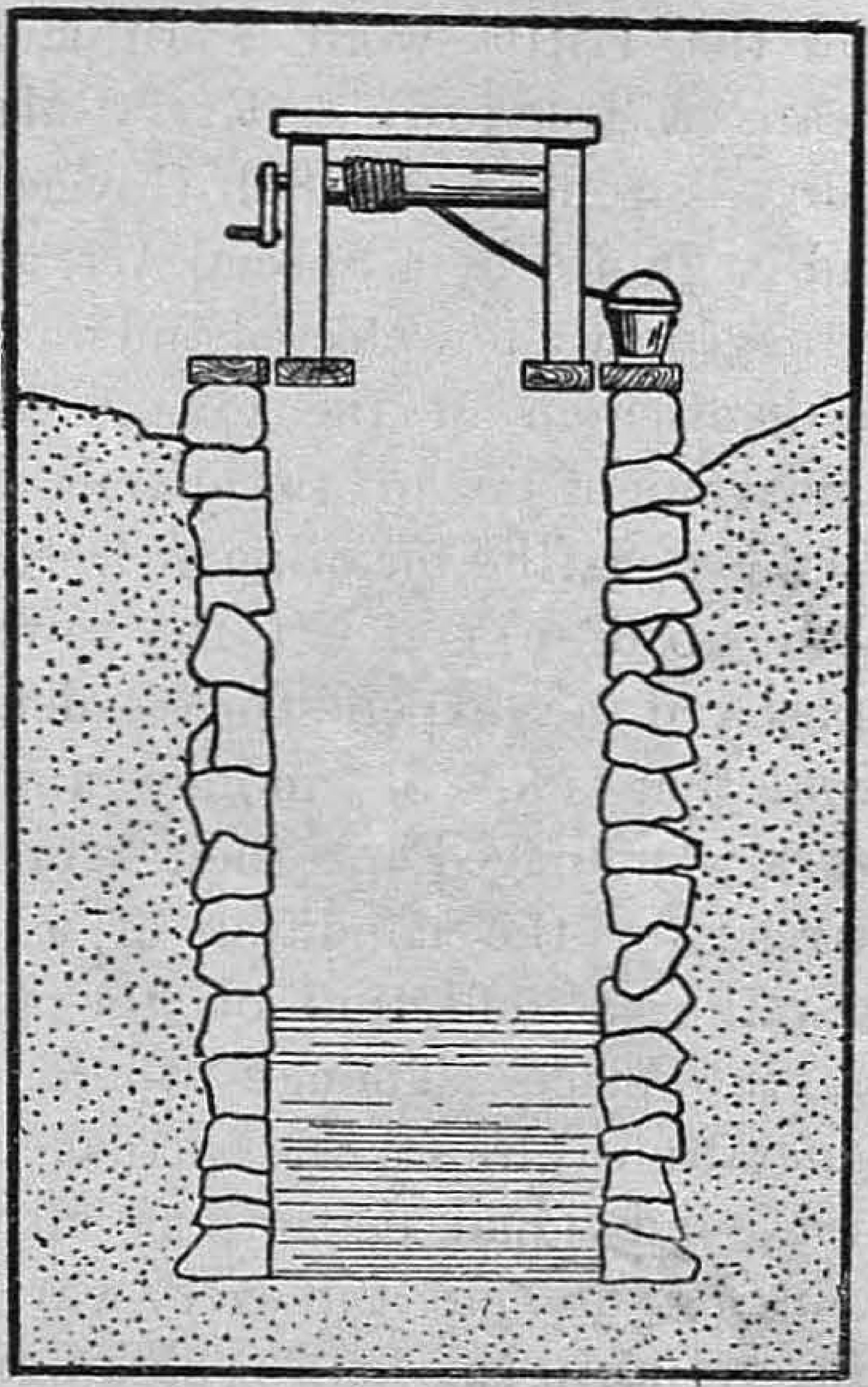
Before constructing a house you are to follow certain rules. See that it is placed on a raised land. See that proper measure is taken for ventilation and light. See that the house drains are made adequately. Often more stress is laid on structural safety, discarding the rules of sanitation.

Housing affects much, either directly or indirectly, the health of the inmates. Want of ventilation favours run down of health, tuberculosis, indigestion and other diseases. Want of proper light and sunshine favours growth of vermine and causes injury to the health. Nowadays various regulations of buildings have been and are being made to protect the inmates from insanitation. In small towns, in constructing a building, money is spent



A hygienic Well which admits of no contamination.

sufficiently but ignorance and violation of these regulations sometimes produce a few cells, instead of dwelling rooms. Privies are the most important adjuncts of a house but they are often improperly constructed. After a few months' of residence, the privies become a menace, not only to the health of the inmates of the house but also to the public. There should be adequate water supply for the house. Often the shallow well and especially in the vicinity of a privy is a source of immense danger to its users. In our poor country the female members are to remain in the kitchen eight or ten hours of the day; and a dingy room is often constructed for this purpose, which is a great folly. None gives sufficient consideration to the fact that much more air is required inside the kitchen, where the burning coal and the lungs of the occupants require a good sup-



An insanitary Well likely to be contaminated.

ply of oxygen. To enjoy the amenities of town life, houses are constructed in the central parts of the town and the cost is much greater than if they are constructed in the suburbs. Thus, the places become more crowded and the primary laws of hygiene are neglected. These houses not only affect the health but also the moral and the progress of the city life; under such conditions, if people become a prey to

preventable diseases, it is their own fault.

Refuses of the house are not bad in fresh condition but are detrimental to health when putrefaction sets in. Thus the removal of these, is a great problem of a town life and the largest share of the income and the greatest exertions of a Municipality are spent for this purpose, and the duty of the tax-payers does not end with the payment of the conservancy tax only. If they want the full benefit of the removal, their co-operation is greatly needed in this respect. Finally they must not keep the refuses inside their houses till they begin to rot, facilitating the growth of injurious micro-organisms. Secondly, as long as they are kept inside the house, there should be a receptacle inside, better a covered one, thereby preventing the scattering of the refuse which may lead to the soiling of the surroundings. Thirdly, they should be thrown inside a road-side dustbin and not on the road, as it will cause nuisance not only to the inmates of the house in the front but also to those of the neighbouring houses and to the passers-by.

The service privies, unless they are taken proper care of, are the chief sources of gastro-intestinal diseases. See that the stool pan is not in a broken condition, see that there is a well fitted trap door, see that regular washing of the privy and the seat chamber is done, see that some form of disinfectant is used at intervals. This will keep the privies in a sanitary condition. Law also enforces screening the privy from public view to prevent nuisance. Broken pans cause filth. Trap doors are required specially to prevent breeding of flies. The flies are well-known vectors of various sorts of diseases and every preventive measure should be adopted against the breeding places inside and outside the house. Night soil, refuses and manures are the chief breeding places of the flies.

In every town there is some arrangement for supplying free drinking water either filtered water or water from a well or tank. Now-a-days tube wells have become much in vogue and the water from this source does not require any artificial filtration. Every attempt should be made to drink pure water and every one should be scrupulous in this matter. For, negligence on your part in this matter will make you suffer from water-borne diseases. Is it not your own fault? You not only suffer yourselves but at the same time endanger the public health also. When any sample of water is not beyond suspicion, boiling the water is the safest course.

Next comes the question of food. The greatest personal knowledge and at the same time risk are concerned in the choice of food you take. The quality, the quantity and the nature of food are the factors to keep you either in health or in disease. It is a broad subject to deal with and unless you have got adequate knowledge about this vital point of life, none can help you from outside and it is useless to talk about public life and nation. The first problem is to get uncontaminated, fresh and pure supply of food. The second problem is nutrition, and it is the criterion of individual as well as of public health. The Government is taking interest in the second problem and the local bodies try to tackle with the first problem, but unless you, have sufficient knowledge about it,

and heartily co-operate with the local bodies and the Government, yourself, your nation and your progeny are sure to be wiped out of existence in the long run. Sanitary measures are laid down for the inspection of the markets, hotels, dairies, etc. and they are subject to the laws of the Municipality, the Food Adulteration Act, the Penal Code etc. But unless individual attempts are made to get pure, fresh and wholesome food and unless care is taken to see that flies, dirt and the carriers of diseases do not contaminate the food, nothing can be done by these preventive measures alone.

The preventable diseases can be averted only if individual attempts are directed towards the eradication of the diseases. Unless the masses are educated, and unless you take care of yourself, little can be expected from the efforts of the Public Health Department. The first and most important point for controlling a disease is to know the way and the mode in which the disease is spread. Elementry hygiene has been incorporated in the primary education of all the countries and almost every one is cognizant of the general rules. It is only by following the precautionary measures, in which many are found horribly lacking, that you can be healthy and happy. The affected persons are more responsible for the propagation of the diseases, as they are often found to take very little care about the discharges of the body liable for the spread of the disease and the healthy persons contract the same, either through their carelessness or through unavoidable means. I have seen people who are very much afraid of smallpox and cholera; they won't even go to the locality where there is a case. But they refuse to take vaccination against smallpox or inoculation against cholera; on the other hand they would mix up with the contacts and would take bazaar-prepared food with impunity. The increase of cinema houses and restaurants has become a menace to public health and care should be taken to avoid these sources of infection, the hot beds of various air-borne, food-borne and contagious diseases.

There is a great difference in the sanitary rules of rural and urban populations. In this small article, I want to draw the attention of the persons living in a town, to some of the important rules. In some points there is a similarity but there are also special points. I do not want to go into further details of the many points which need consideration in every day life. What I intend to say, is only this, that unless you help yourselves in the matter of following the hygienic principles, nothing practically can be done for your improvement. The idea "God helps those who help themselves" so nicely applies to this matter that it can be made a motto for this subject. Finding fault in others' works does not help, but real effort should be made by one and all to make Municipal administration a success.

Antenatal Care or Duties Toward Pregnant Women

By Dr. Haridas De.

Late Senior House Physician, Campbell Hospital, Calcutta

The article with the above heading comes under the preventive part of midwifery and is so very common that the readers might offer a scant courtesy of running their eyes over it. Yet I am tempted to write a few lines on the subject in view of the fact that by taking proper care of a pregnant woman in the early part of pregnancy, many untoward complications which may arise before, during and after labour, could easily be prevented. The lay public in our country give very little importance to this subject. But every member of our sacred and noble profession should preach to and teach the laity, the importance of antenatal care, so that they may be trained how to take care of pregnant women. Then they can understand the evil effects of neglecting pregnant women. Mortality during the time of labour due to severe and various complications is gradually increasing day by day and the reason for it is nothing but sheer ignorance of our people to take preventive measures. Pregnant women generally die of eclampsia, pre-eclamptic toxaemia, toxaemic vomiting, albuminuria, etc. during the time of pregnancy, excessive haemorrhage during, and after labour, septic fever after labour etc. which may be checked and prevented by taking proper care and treatment in the early stages. Again abortion, miscarriage, abnormal position of the child and various other complications of pregnancy can also be checked by antenatal hygiene. The organs of the body of pregnant women are liable to an increased strain due to over-metabolism · so every possible means should be taken to diminish such break down. Besides the medicinal treatment the following hygienic rules should be followed by pregnant women :—

Diet.—Pregnant women will naturally require more diet to compensate for greater metabolism and tissue waste. They should take nutritious and at the same time easily assimilable diet. Their meal should consist of light things with vitamin and calcium value such as milk butter, green vegetables, fish, chicken, tomato etc. They should avoid high seasoned and indigestible foods. They should take plenty of plain water, glucose water, dall water etc. regularly so that urination becomes free and profuse. The kidneys are thus helped to eliminate the waste products of the body.

Dress.—Tight clothings which are becoming a fashion now-a-days in our country should be avoided. Tight clothing gives pressure to the already embarrassed heart, liver and other organs. They should put on light clothings, that suit them.

Baths.—Pregnant women should take their baths regularly every day. Soap may be frequently used to keep

the skin pores free. But special care should be taken to keep the vulval region clean.

Bowels.—Constipation which is a common factor in pregnant women should by every possible means be avoided. Plenty of fruits, milk, green vegetables, fruit juice etc. may help purgation. If these fail, mild purgatives such as pulv. glycezerhae co, cascara sagarda etc. should be taken and strong purgatives should be avoided which may cause abortion or miscarriage

Exercise.—Pregnant women should take regularly mild exercises in open air. The wrong idea amongst us that pregnant women should do nothing but take absolute rest, should be removed from our minds. Any kind of violent exercises or work should be avoided.

A pregnant woman should at once consult a medical man when she notices any of the following symptoms ;—(1) Scanty urine (2) swelling of the face or feet. (3) Persistent Headache. (4) Dimness of vision and flashes of light before the eyes. (5) Bleeding.

The urine of a pregnant woman should be examined once a month in the early period and once every fortnight during the latter part of pregnancy. The quantity of the urine passed in 24 hours should be measured. Slight detection of albumin in the urine, should be taken special care of and treatment given.

Topics of Interest from Health Periodicals

The Bed Bug.—By S. F. A.—The bed-bug finds a place under the verminous affections of our body, along with fleas, lice, etc. Unless we are thoroughly troubled by them, we take no notice of them ; those who have been able to acclimatise themselves to their presence in their beds just forget them in the morning unless their attack is a massed one and the habitual occupant of the bed was away for a few days on a holiday and returned. Most of us have no use for the bug ; it is only a nuisance. To the students who are good sleepers it is a good friend at the verge of the examinations. He will be up early and at his books. Our readers in particular cannot bring home to the bed-bug any disease in which it plays the role of transmitting agent. During the time of Col. Donovan, at least in Madras, the bed-bug was to the fore and incriminated as the transmitter of K. A. by Major Paton and others. Then the Reduviid Bug (*Conorhinus megistus*) took its place and was later abandoned. Then the sand-fly (*Phlebotomus argentipes*) took its turn on the main ground of its geographical distribution coinciding with the distribution of K. A. Thus the bed-bug becomes handy to research workers as a transmitting agent till something definite is found elsewhere. No one at the present moment believes in its transmission of Leprosy.

Life History.—Some of the salient points in the life history of the

bedbug should be understood before an efficient control can be worked out. Most of us, or in fact all of us, are familiar with *Cimex rotundatus*—the Indian bed-bug. As described in most books, it nither bites nor sucks. The beak is adapted for piercing the skin and the blood ascends by capillarity and not by suction. The female lays about fifty eggs (c f *Pediculus capitis*) and these hatch out after a week to ten days. The larvae are transparent and elude detection. After several moults, adult stage is reached in two to three months. The average age of the bed-bug is about a year. Blood, human or other mammalian, is its main subsistence: when not within reach, it may subsist on dirt, mud, etc. It is able to starve for long periods, and can also travel from house to house. They live in the crevices and cracks of all the public conveyances; beds and cane-chairs are much preferred as they can be near their hosts. They bite by night and by break of day get into their hiding places. Holes in the walls are usually full of them in an infected house. Mats—reeds, bamboo, palmyra and cane afford a good protection. The Madras Tamil name மூட்டுப்பூச்சி is perhaps derived from its predilection for joints in furniture: and the other shorter name மூட்டை, refers to its peculiar habit of clinging to baggage, packs and luggages as a means of transport to new habitations. How often the infection is carried in our dresses (creases) unawares to an uninfected home. Hostels, boarding schools, boarding houses, hospitals, etc., have their periods of trouble and sometimes the bugs are always to be found.

Skin lesions.—Punctures produced by the bug give rise to Urticaria, as in the case of the mosquito bites, attended with itching or burning. The urtication lasts from 24 to 48 hours and subsides. Numerous 'bites' in a limited area may give rise to an oedematous patch. Daily repeated punctures may cause scratching and impetiginization: this is specially the case in boarding houses, ships and barracks Any weak antiseptic ointment or a weak solution of liquor Ammonia will deal with the cases satisfactorily. This skin lesion produced by the bed-bug has been honoured by the name of 'Hemipteriasis.'

Control.—It is very difficult to eradicate the bed-bug from an infected place; success will depend on the thoroughness with which the Vermicide is applied. Shylock was prepared to spend 3,000 ducats when his "house was troubled with a rat and to have it baned". A funny story is told of another who was much in trouble through the bed-bugs. Finding an advertisement, "How to kill bugs effectively, write to.........(here the address of a firm in Europe was given). Send five shillings along with the letter", the sufferer wrote for advice and sent the postal order for the required amount. In due course, the post brougt a small parcel and a letter. The former contained two small polished wooden slabs (square shaped) and the letter contained the laconic direction, "when the bugs bite, light the lamp, get hold of the bugs, put them on one slab and squash them with the other". Comment is unnecessary, but it is the extreme trouble that made the man write for advice. Perhaps, in crevices, etc., hand picking and destroying is more effective as regards stray ones.

Fumigation by cyanide vapour will require an apparatus and a trained technician and is fairly effective. All wood-works should be opened out and reapers or boards removed from beds, etc. Holes on walls, nooks and crevices where cynaide vapour may not be able to penetrate may be previously treated with advantage with kerosine, petrol, carbontetrachloride or a mixture of cresol and kerosine. Sulphur may be volatilised and the rooms kept closed for 6 to 8 hours, and then all doors and windows opened out to waft away the irritating sulphur fumes. Sulphur, though easily used and cheap, has its draw-back. It blackens certain articles, tarnishes paints and some fabrics are bleached.

Mats will require destruction by fire; the bent-in edgings of these are laden with bugs, transparent larvae and eggs. Iron beds may be directly flamed and for this purpose a painter's type of Primus lamp with a side handle will be found useful. Most of the senior students attending the hospital have seen this method of " debugging " the iron cots in the wards. Wooden beds, cane-chairs and wooden chairs can be freed of bugs by using boiling water. Joints and crevices have to be filled with the boiling water by means of tins attached to a wooden handle. The servants should be supervised by a responsible person. Mattresses and pillows may be left out in the sun and require frequent change of position to get the sun.

Tanglefoot Corporation has introduced an apparatus, for volatilising Pyrethrum powder, in the form of an atomiser and it is really an advantage on all other methods.—*Medical College Magazine.*

Control of Smoking Habits.—By Paramahamsa Swami Sivananda Saraswathi, " Ananda Kutir " Rishikesh, Himalayas.—Smoking is an evil habit. Smokers bring a little bit of philosophy and medical opinion in support of their principles. They say: "Smoking keeps bowels free. I get a good motion in the morning. It is very exhilarating to the lungs, brain and the heart. When I sit for meditation after a smoke, I get nice meditation. Why should I give it up?" Very sound philosophy! They bring ingenious arguments to support their evil habit. They cannot get rid of this evil habit. They are heavy smokers who can finish a tin of cigarettes within five minutes. This habit starts from early boyhood. A little boy gets a curiosity for smoking. He stealthily removes a cigarette from his elder brother's pocket and tries a first smoke; he gets a little tickling of nerves and hence he continues stealing daily. After some time he arrives at a stage when he finds it extremely hard to manage with a few cigarettes. He begins to steal money to get a tin of cigarettes independently. The father, brothers and sisters are all heavy smokers. They are the Gurus for these little boys for initiation in smoking. What a nasty state of affairs! Horrible indeed is the sight!

The parents are wholly and solely responsible for the evil conduct of their sons and daughters. Any intoxicant brings in a bad habit soon and the man finds it difficult to give up the habit. He falls a prey to smoking. Maya havocs through habits. This is the secret of her workings. You will not get an iota of benefit from smoking. Pray, give up this wrong, foolish imagination. Money is simply wasted. Smoking brings irritable heart, " tobacco heart,"

and amblyopia and other deadly diseases of the eyes and nicotine poisoning of the system. Various nervous diseases and impotence also develop.

Short-sightedness, palpitation of heart, irregular action of the heart, angina pectoris, (a painful disease of heart) gastric catarrh, throat troubles, inflammation of the wind pipe or trachea, tremors, muscular weakness etc., have been traced to smoking and the consequent nicotine poisoning. There is cumulative effect of nicotine from protracted smoking. The nicotine accumulates in the system by the addition of slow doses and produces deleterious effects on the constitution, various systems and different organs.

The correction of any evil habit is very simple. An advocate was a terrible smoker for a period of fifteen years. With one strong and powerful will he abandoned it entirely. Feel strongly first that you have got an evil habit and feel strongly also that you should give up that evil habit immediately. Think strongly of the advantages of sobriety and temperance. Then you have already attained success. Will strongly "I will give up this intolerable habit this very second." You will succeed. Giving up any bad habit at once is better. The habit of slowly giving up by gradual reduction generally does not turn out to be productive of good results. Beware of recurrences. Turn your face resolutely when a little temptation tries to re-appear. Keep the mind fully occupied in your work. Be always busy. Entertain a strong desire, "I must become a great man presently," All these habits will take to their heels. Feel strongly "I must become a spiritual man." All these habits will fly away.

Use your sub-conscious mind for the eradication of your habits. It is your intimate, bosom friend with whom you should keep companionship at all times. He will make matters all right. Establish new and healthy habits. Develop your will also. Give up bad company and always enjoy *sat-sang* or the company of learned *sadhus* and *mahatmas.* Their strong currents will overhaul your evil habits. Prayer, Japa and Meditation will also help in the eradication of this evil habit. There is nothing impossible under the sun. Where there is a will there is a way.

Johnson's Health Rules.—If Boswell correctly informs us, Dr. Samuel Johson was by no means a conspicuous example of simple living. On some occasions at least, he was a prodigious gourmandizer. Nevertheless, he was a real philosopher and laid down the following very sensible rules for travellers seeking health :

"1. Turn all care out of your head as soon as you mount the chaise.

"2. Do not think about frugality; your health is worth more than it can cost.

"3. Do not continue any day's journey to fatigue.

"4. Take now and then a day's rest.

"5. Get a smart seasickness if you can.

"6. Cast away all anxiety, and keep your mind easy.

"This last direction is the principal; with an unquiet mind, neither exercise, not diet, nor physick, can be of much use."

Johnson might well have added to the above rules of health the importance of eating fruit, of which he himself was very fond. Boswell says that he often ate seven or eight peaches, before breakfast.—*Good Health* (*U.S.A.*)

The human brain is more than three-fourths water.

* * *

Potatoes are as rich in Vitamin C as tomato juice.

* * *

Serum treatment has reduced deaths due to snake bite in the U. S. A. from over 14 to less than 4 per cent.

* * *

Vitamin A has been found in the red blood corpuscles by a French scientist. Its function there may be to aid in fighting disease, a power which some physicians believe it has.—*The Voice.—Thr' The Bloodless Phlebotomist.*

* * *

"Aero-neurosis", a disease occurring only in airplane pilots, has been reported by Dr. Harry G. Armstrong, of the U. S. Army Medical Corps, stationed at Dayton, Ohio, in an article to the *J.A.M.A.* Apr. 18, 1936. Chief among the symptoms of the disease are irritability, stomach distress, sleeplessness, ceaseless activity and depletion of the higher mental centers.—*Science News Letter.—Thr' The Bloodless Phlebotomist.*

* * *

The Oslo Breakfast.—It is the custom in many schools in the West to free milk or hot food at school for poor children. Professor Schiotz of Oslo (Sweden) has worked out a new menu which is called the 'Oslo Breakfast.' It has been adopted in many schools of the Scandinavian countries and the effect on the health of the children has been remarkable.

The 'Oslo' breakfast consists of about one-third quart of milk, whole meal biscuits or bread, a little cheese, an apple or orange and a large pat of butter. This is served to the children when they arrive at school in the morning.

The actual 'energy value' of this meal is not great but it supplies the necessary 'protective' foods, vitamins and minerals. It is said to give complete protection against all types of deficiency usually found in home diet.—*The Treasure Chest.*

* * *

Fever Diet.—During fever there is a marked increase of waste products, and as a result there is a drain on the fat and the muscle substance of the patient, so that substitution by means of a rich diet would seem to be theoretically indicated. On the other hand Hippocrates recommended in acute disease a series of fasting days. Here is a dilemma that exists only in theory not in practice.

In almost all acute febrile diseases appetite for food is lost, and even repugnance against any nourishment is present. An abundance of nourishment in these circumstances merely leads to vomiting.

Many continued feverish states such as typhoid and tuberculosis demand plenty of nourishment. Carbohydrates and sugar containing food in any form, are more readily absorbed than meat diet.

The ordering of heavy wine is contra-indicated. A diet without alcohol is better. Sometimes alcohol soothes pain and encourages appetite.

The taking of water, weak tea and fruit juice is encouraged.—*F. von. Muller, Deutsch. med. Woch., No. 1, 1936.—Medical World.*